

Supporting Information

A Novel Polytetrahydrofuran Based Shape Memory Polyurethane Enhanced by Polyglycolide-*block*-Polytetrahydrofuran-*block*- Polyglycolide Copolymer

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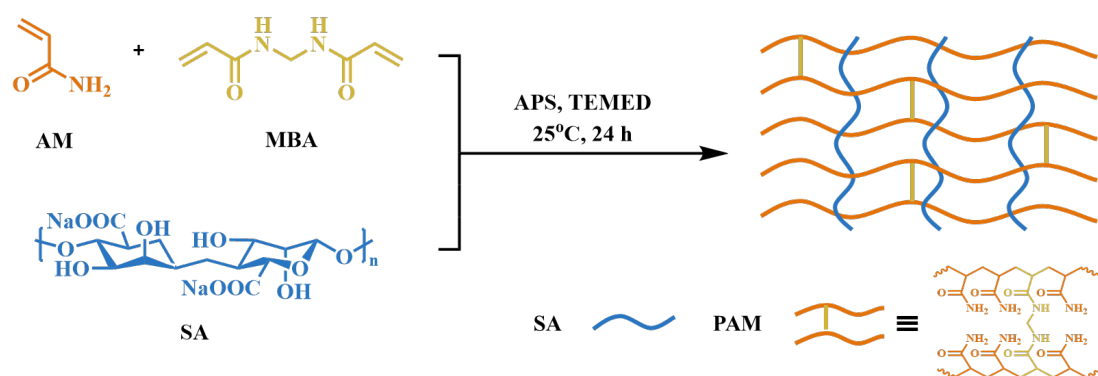


Figure S1. The reaction scheme of the hydrogel

Table S1. Characteristics of the synthesized PGA-PTHF-PGA block polymer.

Sample	M_n^a	M_w^a	M_n^b	PDI ^a
PTHF	1400	1700	2900	1.21
PGA-PTHF-PGA	2900	3500	3800	1.23

^a Number-averaged molecular weight (M_n), weight-averaged molecular weight (M_w) and molecular weight distribution (PDI) were measured by GPC.

^b Calculated from ^1H NMR results.

Table S2. Tensile properties of the PU-GT films.

Sample	σ_b^a / MPa	ε_m^b / %	Toughness ^c / MJ m ⁻³
PU-GT-0	26.0 \pm 1.7	917.5 \pm 33.4	141.9 \pm 12.0
PU-GT-33	34.0 \pm 3.6	1043.6 \pm 17.7	163.0 \pm 15.2
PU-GT-50	35.6 \pm 3.4	1012.9 \pm 29.0	140.5 \pm 5.7
PU-GT-66	14.1 \pm 0.1	950.2 \pm 27.7	48.6 \pm 1.8
PU-GT-100	2.0 \pm 0.5	814.7 \pm 40.2	20.7 \pm 4.2

^a σ_b was the tensile strength of the samples.

^b ε_m was the elongation at break of the samples.

^c The toughness of the samples were derived from integration their stress-strain curves.